

British Columbia Institute of Technology (BCIT) Approved Course List for Registration with the Agrology Profession in British Columbia

List includes courses from BSc Ecological Restoration and Bachelor of Technology Environmental Engineering degrees plus the Sustainable Resource Mgmt Diploma

To be registered as an Articling Agrologist (AAg) leading to the Professional Agrologist (PAg) designation, applicants must have obtained:

A Bachelor's Degree with a science focus from a recognized university of which the course work must consist of the following:

a. A minimum of 8 entry level foundational knowledge courses, usually at the 100 or 200 level, in the subject matters listed on the Academic Worksheet. Applicants may have more than 1 entry level course in the same subject matter and cannot double count in the other two sections of the worksheet.

These can include courses in:

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| - biology | - microbiology |
| - biochemistry | - geology |
| - hydrology | |
| - genetics | May include courses that are of benefit to the study of natural sciences or agrology: |
| - chemistry | - math |
| - earth sciences | - statistics |
| - physical geography | - computer science |
| - physics | - economics |
| - ecology | - communications/Writing |

b. At least 20 courses in agricultural **or** natural sciences **or** agricultural **or** resource economics that relate directly to agrology (as defined by the *Agrologists Regulation, 2021*).

c. At least 8 senior level courses (can come from within the above noted 20 course requirement) in agricultural **or** natural sciences **or** agricultural **or** resource economics that relate directly to agrology (as defined by the *Agrologists Regulation, 2021*). Only senior courses (3rd year level and higher) taught by a Recognized University are recognized as senior level courses.

Courses that are considered eligible for meeting the coursework requirements for BCIA registration are listed in the following categories: Agrology, Foundational Natural Science; Mathematics or Statistics; Economics, Communications /Writing and Computer Science. *The Credentials Committee has the authority to limit how many foundational courses are accepted in each subject matter.*

*Course requires supporting documentation; may or may not be accepted depending on subject matter

This course listing is a guideline only; the Credentials Committee determines eligibility based on a comprehensive course by course review ensuring the academic worksheet is optimized while remaining within the minimum registration requirements.

Approved courses with less than 3 credits may be combined to reach 3 or 3+ credits; under the discretion of the Registrar

Agrology Courses

| Course ID | Title |
|-------------|---|
| CENV 1119 | Environmental Science |
| CENV 2200 | Bioprocessing Fundamentals |
| CENV 3313 | Environmental Sampling and Analysis |
| ECOR 9100 | ER and the Physical Environment |
| ECOR 9200 | Field Applications of Restoration Principles |
| EENG 7213 | Environmental Methods and Techniques |
| EENG 7216 | Soil Mechanics and Hydrogeology |
| EENG 7221 | Environmental Toxicology |
| EENG 7241 | Contaminant Hydrogeology |
| EENG 7242 | Groundwater Modelling |
| EENG 7410 | Applied Climatology and Hydrology |
| EENG 7415 | Soil Mechanics and Contaminant Hydrogeology |
| EENG 7425 | Contaminated Site Investigation and Remediation Processes |
| EENG 7430 | Municipal and Industrial Wastewater Treatment |
| EENG 7717 | Hydrology for EET |
| EENG 7719 | Survey Techniques for EET |
| EENG 8201 | Terrain and Groundwater Assessment |
| EENG 8211 | Mining, Oil and Gas Development and Recreation |
| EENG 8250 | Municipal Wastewater Treatment |
| EENG 8256 | Integrated Water Resource Management |
| EENG 8260 | Integrated Solid Waste Management |
| EENG 8270 | Contaminated Site Investigation |
| EENG 8272 | Contaminated Site Remediation |
| EENG 8273 | Sampling Methods for Contaminated Sites |
| EENG 8281 | Risk Assessment and Management |
| EENG 8282 | Sustainability Management Systems |
| EENG 8285 | Environmental Decision Making |
| EENG 8286 | Environmental Impact Assessment |
| EENG 8290 | Air Quality Management |
| EENG 8293 | Climate, Energy and Carbon Management |
| EENG 8294 | Applied Meteorology and Climatology |
| EENG 8295 | Air Quality Dispersion Model |
| EENG 8303 * | Applied Research Project |
| EENG 8420 | Environmental Sampling and Testing Methods 2 |
| EENG 8750 | Municipal Wastewater Treatment 1 |
| EENG 8780 | Environmental Law |
| EENG 8781 | Risk Assessment |
| EENG 8783 | Risk Management |
| FNAM 1135 | Establishing Plant Communities |
| FNAM 1340 | Hydrology and Riparian Management |
| FNAM 2100 | Terrestrial Ecosystems & Classification |
| FNAM 2110 | Natural Resource Sampling |
| FNAM 2320 | Introduction to Fish & Wildlife |

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| FNAM 3460 | GIS and Remote Sensing |
| FNAM 3700 | Fundamentals of Resource Measurements |
| FNAM 3820 | Silviculture |
| FNAM 4450 | Principles of Urban Forestry & Arboriculture |
| FNAM 4650 | Forest Health |
| FNAM 4810 | Applied Silviculture |
| FNAM 4850 | Urban and Interface Silviculture |
| FSTY 405 | Forest Ecosystem Modelling |
| GIST 7128 | ARCGIS 1 - Introduction |
| RENr 1105 | Natural Measurement 1 |
| RENr 1120 | Intro Aerial Photo and Mapping |
| RENr 1125 | Plant Identification |
| RENr 2100 | Ecosystem Classification |
| RENr 2102 | ArcGIS for RENr |
| RENr 2110 | Natural Measurement 2 |
| RENr 3190 | Environmental Monitoring |
| RENr 3220 | Wildlife Ecology and Management I |
| RENr 3225 | Fish Ecology and Management I |
| RENr 4220 | Wildlife Ecology and Management 2 |
| RENr 4225 | Fish Ecology and Management 2 |
| RENr 7001 | Biological Foundations for Ecological Restoration |
| RENr 7002 | Environmental Assessment |
| RENr 7003 | Principles of Restoring Disturbed Landscapes |
| RENr 7004 | Fish and Wildlife Ecology and Management |
| RENr 7005 | Field Skills for Ecological Restoration |
| RENr 7100 | Principles of Ecological Restoration |
| RENr 8001 | Population and Community Ecology |
| RENr 8101 | Terrestrial Ecosystem Restoration |
| RENr 8102 | Restoration of Freshwater Aquatic Ecosystems |
| RENr 8103 | Applied Conservation Biology |
| RENr 8104 | Applications of Fire in Ecosystem Restoration |
| RENr 8106 | Wetland and Estuary Restoration |
| RENr 8107 | Restoring Wildlife Populations |
| RENr 8108 | Applied Stream Channel Morphology |
| RENr 8109 | Restoration of Old Fields and Grasslands |
| RENr 8110 | Lake Restoration and Applied Limnology |
| RENr 8201 | Terrain and Stream Channel Assessment for Ecological Restoration |
| RENr 8302 * | Applied Research Project 1 |
| RENr 8303 * | Applied Research Project 2 |
| SRMT 1310 | Environmental Climatology Resource Management |
| SRMT 2300 | Dendrology |
| SRMT 2350 | Urban Soils |
| SRMT 2800 | Vegetation Treatment Skills |
| SRMT 3400 | Remote Sensing |
| SRMT 3820 | Silviculture |
| SRMT 4650 | Forest Health |

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| SRMT 4670 | Wildland and Community Fire Management |
| SRMT 4810 | Applied Silviculture |
| SRMT 4850 | Urban and Interface Silviculture |

Foundational Natural Sciences Courses

| Course ID | Title |
|-----------|---------------------------------|
| CHEM 1121 | General Chemistry |
| CHEM 2409 | Organic Chemistry 1 |
| CHEM 3310 | Physical Chemistry |
| CHEM 3409 | Organic Chemistry 2 |
| EENG 7211 | Chemistry and Organic Chemistry |
| EENG 7217 | Hydrology and Hydrometrics |
| EENG 7710 | Chemistry 1 for EET |
| EENG 7711 | Chemistry 11 for EET |
| RENR 1103 | Earth Science & Soils |
| RENR 2117 | Applied Ecology in BC |
| RENR 7210 | Applied Chemistry |
| PHYS 1181 | Physics 1 |
| PHYS 2149 | Physics for Mechanical |
| PHYS 2181 | Physics 2 |

Mathematics and Statistics Courses

| Course ID | Title |
|-----------|---|
| MATH 1451 | Technical Mathematics for Renewable Resources |
| MATH 2415 | Statistics for CENV |
| MATH 2416 | Calculus for CENV |
| MATH 2453 | Statistics for Renewable Resources |
| MATH 3499 | Differential & Linear Equations |
| MATH 4416 | Differential Equations & Numerical Methods |
| MATH 7100 | Biostatistics for Natural Resource Managers |

Economics, Communications/Writing Courses

| Course ID | Title |
|-----------|---|
| COMM 1145 | Tech Communication 1 for RENR |
| COMM 2245 | Tech Communications 2 for RENR |
| ECON**** | Any microeconomics or macroeconomics course |
| LIBS 7001 | Critical Reading and Writing |